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ART UNIT	PAPER NUMBER
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Please find below and/or attached an Office communication concerning this application or proceeding.

PTO-90C (Rev. 10/03)

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE <u>3</u> MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *18 April 2006*.

2a)☒ This action is **FINAL**.   2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-23* is/are pending in the application.

    4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-23* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☒ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a)☐ All b)☐ Some * c)☐ None of:

      1.☐ Certified copies of the priority documents have been received.

      2.☐ Certified copies of the priority documents have been received in Application No. _____.

      3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1)☐ Notice of References Cited (PTO-892)

2)☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3)☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
    Paper No(s)/Mail Date _____.

4)☐ Interview Summary (PTO-413)
    Paper No(s)/Mail Date. _____.

5)☐ Notice of Informal Patent Application (PTO-152)

6)☐ Other: _____.

DETAILED ACTION

1. Claim(s) 1-23 has/have been presented for examination based on amendment filed on 18th April 2006.

2. Claim(s) 1-3, 6, 11-12, 21, 22, and 23 are amended.

3. The arguments submitted by the applicant have been fully considered. Claims 1-23 remain rejected. The examiner's response is as follows.

Response to Applicant's Remarks for 35 U.S.C. § 101

4. Applicant has amended the claim 1 to output the results of the step for "determining the modification" as "a result of the resulting information system architecture". Examiner withdraws the rejection for claims 1-10 under 35 USC 101.

5. Examiner also withdraws the rejection for claims 11-20 under 35 USC 101 in view of amendment to the claim to include a processor, however this brings in a new limitation for which support is found in a incorporated reference as pointed out by the applicant (application 09/127,191 now US Patent No. 6,311,144). Please see rejected under improper incorporation by reference of essential matter.

Response to Applicant's Remarks for 35 U.S.C. § 112/1st

6. Applicant has argued pointing to MPEP 2173.05(i) and 2163I.B, that these sections

allows a claim limitation to exclude characteristics of the prior art, and does not

require literal basis in the specification for the negating limitation.

Examiner disagrees with the applicant's rationale for the following reasons.

MPEP 2173.05(i) is particularly applicable to rejection under 35 USC 112¶2nd,

whereas the rejection presented was made under 25 USC 112¶1st.

MPEP 2173.05(i) states:

> The current view of the courts is that there is nothing inherently ambiguous or uncertain about a
> negative limitation. So long as the boundaries of the patent protection sought are set forth
> definitely, albeit negatively, the claim complies with the requirements of 35 U.S.C. 112, second
> paragraph.
>
> **Any negative limitation or exclusionary proviso must have basis in the original disclosure.**
> If alternative elements are positively recited in the specification, they may be explicitly excluded in
> the claims. See In re Johnson, 558 F.2d 1008, 1019, 194 USPQ 187, 196 (CCPA 1977) ("[the]
> specification, having described the whole, necessarily described the part remaining."). See also
> Ex parte Grasselli, 231 USPQ 393 (Bd. App. 1983), aff'd mem., 738 F.2d 453 (Fed. Cir. 1984).
> The mere absence of a positive recitation is not basis for an exclusion. **Any claim containing a
> negative limitation which does not have basis in the original disclosure should be rejected
> under 35 U.S.C. 112, first paragraph, as failing to comply with the written description
> requirement.** Note that a lack of literal basis in the specification for a negative limitation may not
> be sufficient to establish a prima facie case for lack of descriptive support. Ex parte Parks, 30
> USPQ2d 1234,1236 (Bd. Pat. App. & Inter. 1993). See MPEP § 2163 - § 2163.07(b) for a
> discussion of the written description requirement of 35 U.S.C. 112, first paragraph.

Applicant has not cited any section of the original disclosure explicitly removing the

negative limitation or exclusionary proviso. On contrary examiner has cited

paragraph [0014] of the specification in previous rejection supporting the rationale

that new proposed system architecture is influenced by existing system.

It would be evident to one of ordinary skill in the art of system design that if the

existing system was performing as required, i.e. meeting the business requirements

(business process design), this exercise in designing a new proposed system would

have been futile. *The determination that business requirements are not met*

mandates measuring and collecting data of a prior existing information system and

measured performance thereof. Hence the new proposed system must be designed

to overcome the deficiencies of the prior existing system, incorporating such goals in

the proposed business requirements. Specification [0031] discloses:

> [0031] At 150, the comparison module 40 makes an initial determination as to whether the modeled performance metrics of the business processes satisfy the business requirements as defined in the business process design. **According to one embodiment, the comparison is performed as the difference between the value of a modeled performance metric and the value of a corresponding business constraint, such as response time.** Fuzzy logic may also be used to ascertain whether a modeled performance metric satisfies a defined business constraint.

Further the new proposed system is not designed from scratch, it incorporates the

elements from prior existing systems as vendor provided [performance] benchmarks

and industry standard specifications. See Specification [0037] discloses:

> [0037] At 210, the modification engine 50 determines modifications to the system architecture to address the unacceptable performance metrics of supporting hardware and software components modeled in the system architecture. According to one embodiment, the rule-based modification engine 50 searches a logic tree implemented within a data store. **The identity of the supporting component models and their unacceptable metrics are used to search the logic tree for recommended modifications according to industry standards, vendor benchmarks, or prior modeled results. For example, if an increase in memory size is the recommended modification, the recommended size is a value obtained either from previous modeled results, vendor-provided benchmarks, or industry standard specifications.** Such modifications may include replacement of the one or more supporting component models with alternate component models.

As shown the on contrary the ***specification supports the use of*** *measuring and*

collecting data of a prior existing information system and measured performance

thereof, therefore the basis negative limitation is not only absent from specification,

the positive limitation is further re-enforced by disclosure in specification and the

knowledge of one of ordinary skill in the art of system design. Examiner respectfully

maintains the 35 USC 112¶1st rejection as presented in previous office action.

Response to Applicant's Remarks for 35 U.S.C. § 103

7. Claims 1-5, 21-23 were rejected under 35 U.S.C. 103(a) as being unpatentable over EUROEXPERT in view of White.

8. Applicant has argued that EUROEXPERT cites a bottoms-up approach and current design discloses a top-down approach in proposed system architecture design. No support from the specification is cited and the basis of the argument is that in neither model construction nor performance modeling step the present invention measure and collect data of an existing information system.
    As pointed out in the response to 35 USC 112¶1st rejection above, examiner respectfully disagrees with applicant's rationale. Applicant's arguments fail to comply with 37 CFR 1.111(b) because they amount to a general allegation that the claims define a patentable invention without specifically pointing out how the language of the claims patentably distinguishes them from the references due to lack of any support from specification for the claimed features.

9. Applicant has argued that White is directed towards discrete event approach whereas present invention is continuous service of proposed information system. Applicant has not presented any new argument and Examiner respectfully maintains previous response that White teaches continuously repeating the six-sigma steps till the desired high quality process is achieved (White: Pg. 31 – Six steps to six sigma – step 6). Further applicant fails to point out support for this limitation in the disclosure.

10. Applicant has argued that White discloses a "way of doing business" rather than a

computer implemented process and system.

Examiner respectfully disagrees as White reference is used to disclose a six-

sigma methodology well known in the art of business systems designs. In the same

sentence it also says that six sigma is also "a tool for improving quality" (White: Pg.

28 Col.1 Section A¶2). White shows that this methodology can be applied to even a

process, system or component design (White: Pg. 28 Col.2 Last paragraph).

Applicant's arguments relating to White's teaching are found to be unpersuasive.

11. Applicant has summarized that no combination of White-EUROEXPERT teaches or

suggest a multilayered mathematical model. EUROEXPRT teaches the multilayered

model, but does not explicitly teach model to be a mathematical model. White

reference is used to teach mathematical modeling based six-sigma methodology

(White: Pg 32, Col. 2, Design Example; Pg. 29 Eq.1; Pg. Eq.2-3 etc.). Examiner

respectfully disagrees with the applicant and points the applicant to the rejection

provided in the previous office action for claim 1. Applicant's arguments are found to

be unpersuasive and rejections for claims 1, 11, 21, 22, and 23 are maintained.

12. Claims 6-20 were rejected under 35 U.S.C. 103(a) as being unpatentable over

EUROEXPERT in view of White, further in view of Hartley.

Applicant's arguments against EUROEXPERT-White combination are found to be

unpersuasive and basis of argument against Hartley is addressed in those

arguments. Harley reference is not used for the arguments made against Hartley.

Rejection for claims 6-20 is maintained.

New Claim Rejections under 35 USC § 112¶1st for amended claims

The following is a quotation of the first paragraph of 35 U.S.C. 112:

> The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

13. Claims 11-22 are rejected under 35 U.S.C. 112, first paragraph, as based on a disclosure which is not enabling. <u>Tangible components of a system (for example digital processor, display etc.</u>) for a system claim, critical or essential to the practice of the invention <u>is included in the claim(s) is not enabled by the disclosure</u>. See *In re Mayhew*, 527 F.2d 1229, 188 USPQ 356 (CCPA 1976).

14. The rationale for the above rejection is, even though Applicant has amended claim 11 to include "a digital processor", and pointed to application 09/127,191 now US Patent No. 6,311,144 for support. As presented the current application does not have support for a system, as admitted by the applicant. Support for a system claim is essential subject matter because of being new statutory category.

37 CFR 1.57. Incorporation by reference states the following for incorporation of essential subject matter:

> (c) " Essential material " may be incorporated by reference, but only by way of an incorporation by reference to a U.S. patent or U.S. patent application publication, which patent or patent application publication does not itself incorporate such essential material by reference. "Essential material " is material that is necessary to:
> (1) Provide a written description of the claimed invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same, and set forth the best mode contemplated by the inventor of carrying out the invention as required by the first paragraph of 35 U.S.C. 112;
> (2) Describe the claimed invention in terms that particularly point out and distinctly claim the invention as required by the second paragraph of 35 U.S.C. 112; or
> (3) Describe the structure, material, or acts that correspond to a claimed means or step for performing a specified function as required by the sixth paragraph of 35 U.S.C. 112.

Application No. 09/127,191 was not a U.S. patent or <u>U.S. patent application</u>

<u>publication</u> at the time the present application was filed. Hence incorporation by

reference of an unpublished U.S. Application is not proper for the essential matter in

the current application. By the same rationale system claims 21 and 22 also do not

have support in the specification, thereby failing for written description requirements.

It seems the current specification only has support for apparatus and method claim

sets. Therefore claims 11—22 are rejected under 35 USC 112¶1st also.

New Claim Rejections under 35 USC § 112¶2nd for amended claims

The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly
> claiming the subject matter which the applicant regards as his invention.

15. Claims 2-10 recites the limitation in a "process" format. There is insufficient

antecedent basis for this limitation in the claim. Claim 1 was amended to replace

"method" instead of "process", but dependent claims were not modified.

16. Claims 11-20 recite a system claim having a limitation

> "in a digital processor;
> "a storage design module..." etc.

It is unclear in claim 11, if the system <u>comprises</u> "a digital processor" or the system

<u>is in</u> "a digital processor". Further, as best understood the modules are software per

se; therefore it is unclear if the applicant intended for all the modules (software) to be

"in the digital processor", which is understood as execution unit as compared to

being a software (module) storage unit. Hence an attempt to make the system

statutory has introduced numerous other deficiencies in the claim and claim is

rejected as being vague and indefinite.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

The factual inquiries set forth in *Graham* v. *John Deere Co.*, 383 U.S. 1, 148

USPQ 459 (1966), that are applied for establishing a background for determining

obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

This application currently names joint inventors. In considering patentability of the

claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the

various claims was commonly owned at the time any inventions covered therein

were made absent any evidence to the contrary. Applicant is advised of the

obligation under 37 CFR 1.56 to point out the inventor and invention dates of each

claim that was not commonly owned at the time a later invention was made in order

for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35

U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

17. Claims 1-5, 21-23 are rejected under 35 U.S.C. 103(a) as being unpatentable over EUROEXPERT - Best Practices: French Social Security - UNEDIC dated 1992 in view of IEEE article – "An Introduction To Six Sigma With Design Example" by Robert White dated 1992.

Regarding Claim 1

EUROEXPERT Best Practices document discloses

> *"A computer implemented method for designing a model based <u>information system</u> architecture, <u>the information system architecture being the architecture of an information system which includes a number of interconnected hardware and software components implementing one or more business solutions,</u> comprising <u>the steps of</u>:*
> *providing a business process design, the business process design describing a plurality of business processes and defining a set of business requirements for each business process;*
> *constructing a multi-layer mathematical model of a proposed <u>information system</u> architecture supporting the business process design, the layers of the multi-layer model comprising a business layer, an application layer, and a technology layer, <u>the business layer, application layer and technology layer having different data than each other;"</u>*

as a tiered model GATE model identical to claimed model application that collects measurements from 3 domains, namely, business domain/layer, application domain, technology/system/network domain, illustrated by a figure called "Modeling Business Value Chain" (EUROEXPERT Best Practices: Col 2), *representing an **information system** (EUROEXPERT: Fig on Pg.2) where each layer has different data than each other (EUROEXPERT: Fig on Pg.1)*. This model incorporates the business goals and characteristics of the system design. It can be seen from the reference that this model captures the business requirements for business processes as well as delegates them to 3 layers. The public knew about this model in February 1992 (EUROEXPERT Best Practices: Col 2, Lines 16-18).

Although the EUROEXPERT Best Practices article discloses the results of the 3-tiered business model, it does not teach specifically modeling the performance matrix of the for each layer, simulating, comparing them to the requirements, acceptability, proposing & modifying the matrix at appropriate layers.

White's article teaches how six-sigma methodology can be used to perfect any process, system or component. This process has its mathematical roots in statistics. The process itself has six steps, namely, identify the required function, specify performance requirements, determine component variation, characterize performance and revise design to meet six-sigma mathematical requirement, repeat previous steps to get higher quality results (White: Pg 32, Col. 2, Design Example). White & EUROEXPERT further discloses,

> *"modeling performance metrics for each layer of the multi-layer model of the proposed information system architecture including continuous service of the proposed information system architecture, said constructing the multilayered model and modeling performance matrix being in a manner free of measuring and collecting of a prior existing information system and measured performance thereof;"*

as the components and their variations can be modeled using an electrical circuit example (White: Pg 33, Col. 1, D Step 3, Line 3-8). These components can then be simulated to measure their performance using various mathematical & statistical calculation, White discloses circuit example with Monte Carlo simulation (White: Pg 33, Col 2, 2nd Paragraph). The amended limitation where the "constructing and modeling being [done] in a manner free of measuring and testing by a prior existing information system architecture" is taught by EUROEXPERT as new architecture (Phase 2 implementing the solution) where the performance evaluations to implement new architecture (e.g. replacing hierarchical database with relational

database – Phase 1: Diagnosis and Optimization) was done to propose changes. If

this limitation is read the way applicant has argued in remarks section.

However, as presented by examiner, new system design cannot be devoid of

considerations present in existing information system, else doing the design for a

new system would be futile.

Although the changes components of core architecture reused by new

architectural choices were evaluated nevertheless, indicating a capability to create

new architecture (Business commentary). Please see arguments relating to re-

engineering above.

White further discloses,

> *"comparing the modeled performance metrics with the set of business requirements for*
> *each business process, said comparing producing respective indications of unacceptable*
> *performance metrics of one or more business processes that do not satisfy the set of*
> *business requirements defined for them based on the produced indications;"*

as results of such a simulation are compared against the expected values (White:

Pg 34, Col. 1, 1-6 & Figure 4). The figure (White: Figure 4) disclosed shows the

unacceptable performance as compared to the expected results.

White further discloses,

> *"and determining modifications to proposed information the system architecture, resulting*
> *in an information system architecture design, a description of the resulting information*
> *system architecture design being output."*

as replacing the instant model and taking other models & values for the sub-

components to enhance and meet performance (White: Pg 34, Col. 1, F Step 5, Line

1-8 & Table V). Modifications are suggested after the results from these simulations

are gathered – i.e., in the circuit example used components of higher tolerances are

suggested (White: Pg 34, Col. 1, F Step 5, Line 15-16). The reference teaches

narrower versions of broader claims in the application. Here a simple electric circuit

example teaches a abstract methodology that can be applied to much bigger multi-

tiered system as claimed. The newly amended limitation adds the outputting the

design, which EUROEXPERT teaches as stage 2 implementation of the model

(EUROEXPERT: Pg.1, Fig. On Pg.2 New functional Elements).

It would have been obvious to one (e.g. a designer) of ordinary skill in the art at

the time the invention was made to take White's teaching and apply them to

EUROEXPERT - Best Practices GATE model disclosed above. The motivation to do

so would be a system than can be simulated with various components to meet the

requirements. Six-sigma process is disclosed as a way of doing business (White: Pg

28, Col. 1, A. What is Six Sigma, Line 6-9) to increase quality & competitive pricing

(White: Pg 28, Col. 2, B "Why Pursue Six Sigma?" Line 1-6), which are also very

good business motivations.

Regarding Claim 2

As disclosed above, White proposes performance matrix modification, update and

comparison (White: Pg 34, Col. 1, 1-6 & Figure 4). He discloses the circuit

component that gives the best results for the quality/cost level (White: Pg 34, Col. 2,

1-3 & Table V). White further discloses a matrix of components with various

tolerances and how they are used to access the performance of the circuit (White:

Pg 33, Figure 3 & Pg 34, Table V & VI). The output of his analysis is selection of the

component, which is least expensive and highest quality (White: Pg 34, Col. 2, 1-3).

Regarding Claim 2

As disclosed above, White proposes performance matrix modification, update and comparison (White: Pg 34, Col. 1, 1-6 & Figure 4). He discloses the circuit component that gives the best results for the quality/cost level (White: Pg 34, Col. 2, 1-3 & Table V). White further discloses a matrix of components with various tolerances and how they are used to access the performance of the circuit (White: Pg 33, Figure 3 & Pg 34, Table V & VI). The output of his analysis is selection of the component, which is least expensive and highest quality (White: Pg 34, Col. 2, 1-3).

Regarding Claim 3

As disclosed above, White identifies, evaluates various components required in the circuit (White: Pg 33, Col. 1, Figure 3). Searching the data store for various components is implicit, as he has already identified the all variations with different tolerances (White: Pg 33, Col. 1, Table 2).

Regarding Claim 4

White suggests that replacement of components be done one at a time to accurately calculate improved performance (White: Pg 34,Col. 1, F Step 5, Line 1-8 & Table V).

Regarding Claim 5

EUROEXPERT & White do not teach modifying the business model if the supporting components models in application and technology layers have unacceptable performance metrics. However, It would have been obvious to one (e.g. a designer) of ordinary skill in the art at the time the invention was made to modify the business model when the supporting components models are not able to meet performance

as it is well-known in the art that business model need to be changed when the

underlying application or technology is unable to support the business goals.

Regarding Claim 21

Claim 21 is rejected for the same reasons as claims 1 & 2.

Regarding Claim 22

Claim 22 is rejected for the same reasons as claims 1 & 2.

Regarding Claim 23

Claim 23 is rejected for the same reasons as claims 1.

18. Claim(s) 6-20 is/are rejected under 35 U.S.C. 103(a) as being unpatentable over

EUROEXPERT - Best Practices: French Social Security - UNEDIC dated 1992 in

view of IEEE article – "An Introduction To Six Sigma With Design Example" by

Robert White dated 1992, further in view of US Patent 6532465 issued to

Hartley.

Regarding Claim 6

Disclosures for EUROEXPERT - Best Practices GATE model and by White are

presented above. These references do not teach mapping between the 3 GATE

domain layers (Claim 6) and presence of buses in the design (Claim 7 & 8). Also

there is no mention of the real-time and batch processing systems (Claim 9).

Hartley discloses that mapping between the different layers can be present attain

a business objective (Hartley: Col. 5 Lines 12-32). Hartley exemplifies the mapping

between the presentation layer and business later in his Figure 4 (Hartley: Col 10,

Lines 50-55, Lines 64-67). But it can be seen in Figure 4 that similar mapping

existing between the layers below the business layer going down towards domain

(application layer) and database (physical database/technological representation

layer) (Hartley: Col. 8 Lines 11-16).

It would have been obvious to one (e.g. a designer) of ordinary skill in the art at the

time the invention was made to use the layering approach, communication strategy

and real-time/batch processing taught by Hartley and apply them to

White/EUROEXPERT references. The motivation would be a design, which is

abstract enough than can handle new business requirements without significantly

changing the underlying architecture, and specific enough that the business layer

can provide rule based processing by passing in metadata. Hence, the business

model would be extremely adaptive to changing business, application &

technological requirements.

Regarding Claim 7 & 8

Disclosures for EUROEXPERT - Best Practices GATE model and White do not

teach presence of buses in the design.

Hartley disclose message buses (Hartley: Col. 11, Lines 4648, 63-65) as means

for interfacing between different layers, in broader terms buses are considered to be

data conduits between different layers. Hartley explains that these layers may be

located on different machine with object layers providing communication (Hartley:

Col 10, Lines 24-31).

Regarding Claim 9

Disclosures for EUROEXPERT - Best Practices GATE model and White do not

teach real-time and batch processing systems.

Hartley exemplarily discloses applications design that respond in real time

(Hartley: Col. 13, Lines 24-31) and another one, which is, batch process driven.

Batch processing example disclosed is collection of customer charges (Hartley: Col.

17 Lines 58-68) & batch report generation (Hartley: Col. 19, Lines 18-23).

Regarding Claim 10

White discloses taking other models and values for the subcomponents to enhance

performance and meet performance (White: Pg 34,Col. 1, F Step 5, Line 1-8 &

Table V).

<u>Regarding Claim 11</u>

Claim 11 is rejected for the same reasons as claims 1, 2 & 9 are rejected. Further

Hartley discloses a system that includes a rule-based engine (Hartley: Abstract

Lines 12-15). The output module is the claim is equivalent to batch output

component that is disclosed in Claim 9.

<u>Regarding Claim 12</u>

Claim 12 is rejected for the same reasons as claims 1, 2.

<u>Regarding Claim 13</u>

Claim 13 is rejected for the same reasons as claims 1, 2.

<u>Regarding Claim 14</u>

Claim 14 is rejected for the same reasons as claims 1.

<u>Regarding Claim 15</u>

Claim 15 is rejected for the same reasons as claims 5.

<u>Regarding Claim 16</u>

Claim 16 is rejected for the same reasons as claims 6.

<u>Regarding Claim 17 & 18</u>

Claim 17 & 18 are rejected for the same reasons as claims 7 & 8.

<u>Regarding Claim 19</u>

Claim 19 is rejected for the same reasons as claims 9.

<u>Regarding Claim 20</u>

Claim 20 is rejected for the same reasons as claims 10.

Conclusion

19. Applicant's amendment necessitated the new ground(s) of rejection presented in this

Office action. Accordingly, **THIS ACTION IS MADE FINAL.** See MPEP

§ 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37

CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE

MONTHS from the mailing date of this action. In the event a first reply is filed within

TWO MONTHS of the mailing date of this final action and the advisory action is not

mailed until after the end of the THREE-MONTH shortened statutory period, then the

shortened statutory period will expire on the date the advisory action is mailed, and

any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing

date of the advisory action. In no event, however, will the statutory period for reply

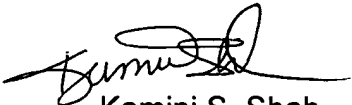expire later than SIX MONTHS from the date of this final action.

Communication

Any inquiry concerning this communication or earlier communications from the

examiner should be directed to Akash Saxena whose telephone number is (571) 272-

8351. The examiner can normally be reached on 9:30 - 6:00 PM M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Kamini S. Shah can be reached on (571)272-2279. The fax phone number

for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent

Application Information Retrieval (PAIR) system. Status information for published

applications may be obtained from either Private PAIR or Public PAIR. Status

information for unpublished applications is available through Private PAIR only. For

more information about the PAIR system, see http://pair-direct.uspto.gov. Should you

have questions on access to the Private PAIR system, contact the Electronic Business

Center (EBC) at 866-217-9197 (toll-free).

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Saturday, July 15, 2006

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